

Amendment to the Specification:

Please replace the last paragraph on page 2 with the following amended paragraph:

“Accordingly, in one broad form of the invention there is provided a demand responsive physiological control system for use with a rotary blood pump; said system including a pump controller which is capable of controlling pump speed of said pump; said system further including a physiological controller, and wherein said physiological controller is adapted to analyse input data relating to physiological condition of a user of said pump; and wherein said physiological controller determines appropriate pumping speed and sends a speed control signal to said pump controller to ~~adjust~~ adjust pump speed; said system further including a physiological state detector which provides said input data indicative of at least one physiological state of said user, in use, to said physiological controller.”

Please replace the second paragraph on page 6 with the following amended paragraph:

“Preferably said heart rate information is derived from voltage and current applied to an electric motor ~~deriving~~ driving said impeller.”